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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/820,747	03/30/2001	Michael J. Sinclair	03797.00037	4737

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EXAMINER

PRETLOW, DEMETRIUS R

ART UNIT	PAPER NUMBER
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2863

DATE MAILED: 08/25/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/820,747

Applicant(s)

SINCLAIR ET AL.

Examiner

Demetrius R. Pretlow

Art Unit

2863

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 10 June 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-10 and 12-26 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 1-10, 12-14 and 23-26 is/are allowed.
- 6) ☒ Claim(s) 15, 17 and 21 is/are rejected.
- 7) ☒ Claim(s) 16, 18, 20, 22 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 30 March 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____
- 4) ☐ Interview Summary (PTO-413) Paper No(s). _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 15, 17 and 21 are rejected under 35 U.S.C. 102(e) as being anticipated by Tareev (US 6,147,680). Tareev teach a first capacitive node and a second capacitive node each commonly coupled to a first electronic circuit node (multiplexer 45) and a third capacitive node and fourth capacitive node commonly coupled to a second circuit node (multiplexer 45). Note Figure 2 and Abstract. Tareev teach first, second, third and fourth capacitive nodes being disposed so as to be adjacent and interdigitated, wherein the pointing member interacts with at least one of the first, second, third, and fourth capacitive nodes. Note column 3, lines 30-63 and abstract.

In reference to claim 17, Tareev teach the first, second, third and fourth capacitive nodes each comprise an etched conductive tracing on a substrate. Note Tareev column 2, lines 50-60 and Figure 3.

Claim 21 contain limitations similar to claim 15, which was discussed above.

Allowable Subject Matter

1. Claims 16,18,19,20, and 22 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.
2. Claims 1-10, 12-14 and 23-26 allowed.
3. The primary reason for the allowance of claims 1-10 is the inclusion of the limitations of a second oscillator including a second capacitive node having a second capacitance depending upon the position of the pointing member relative to the second capacitive node, the second oscillator generating a second signal having a second frequency depending upon the second capacitance and a frequency ratio determinator determining first and second characteristics associated with the first and second frequencies, respectively, and determining a ratio of the first and second frequencies. It is these limitations found in each of the claims, as they are claimed in the combination, that has not been found, taught or suggested by the prior art of record which makes these claims allowable over the prior art.
4. The primary reason for the allowance of claim 23 is the inclusion of the limitations of an a grooved formed in the insulating material and running axially in an axial direction, the first, second, third and fourth capacitive nodes also extending in the axial direction, wherein the pointing member interacts with at least one of the first, second, third, and fourth capacitive nodes. It is these limitations found in each of the claims, as they are claimed in the combination, that has not been

found, taught or suggested by the prior art of record which makes these claims allowable over the prior art.

5. The primary reason for the allowance of claims 24-26 is the inclusion of the limitation of a second oscillator including a second capacitive node having a second capacitance depending upon the position of the pointing member relative to the second capacitive node, the second oscillator generating a second signal having a second frequency depending upon the second capacitance and a processor configured to determine a ratio of the first and second characteristics. It is this limitation found in each of the claims, as they are claimed in the combination, that has not been found, taught or suggested by the prior art of record which makes these claims allowable over the prior art.

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Demetrius R. Pretlow whose telephone number is (703) 308-6722. The examiner can normally be reached on Monday - Friday from 8:00 am to 4:30 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Barlow, can be reached at (703) 308-3126. The fax phone number for the organization where this application or proceeding is assigned is (703) 308-7722.

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-1782.

Demetrius R. Pretlow

Patent Examiner

Demetrius Pretlow 8/19/03

John Barlow
John Barlow
Supervisory Patent Examiner
Technology Center 2800